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**BEFORE THE BOARD OF PATENT APPEALS
AND INTERFERENCES**

Application Number: 10/057,629
Filing Date: January 25, 2002
Appellant(s): DAVIS, HARRY R.

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For Appellant

EXAMINER'S ANSWER

This is in response to the appeal brief filed June 6, 2005.

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(1) Real Party in Interest

A statement identifying the real party in interest is contained in the brief.

(2) Related Appeals and Interferences

A statement identifying the related appeals and interferences which will directly affect or be directly affected by or have a bearing on the decision in the pending appeal is contained in the brief.

(3) Status of Claims

The statement of the status of the claims contained in the brief is correct.

(4) Status of Amendments After Final

The appellant's statement of the status of amendments after final rejection contained in the brief is correct.

(5) Summary of Invention

The summary of invention contained in the brief is correct.

(6) Issues

The appellant's statement of the issues in the brief is correct.

(7) Grouping of Claims

The rejection of claims 1,8-11,13-24,32-45 and 53-56 stand or fall together because appellant's brief does not include a statement that this grouping of claims does not stand or fall together and reasons in support thereof. See 37 CFR 1.192(c)(7).

(8) Claims Appealed

The copy of the appealed claims contained in the Appendix to the brief is correct.

(9) Prior Art of Record

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5846966 Rosenblum et al. 12-1998
Belamarich et al., Pediatrics, 1990;86(6):977-981

(10) Grounds of Rejection

The following ground(s) of rejection are applicable to the appealed claims:

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

The factual inquiries set forth in *Graham v. John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

Claims 1, 8-9, 10-11, 13-24, 32-45, and 53-56 are rejected under 35 U.S.C. 103(a) as being unpatentable over '966 in view of Belamarich et al. (Pediatrics, 1990;86(6):977-981).

'966 also teaches the elected compound herein, ezetimibe, with HMG-CoA reductase inhibitors such as simvastatin, useful for reducing cholesterol and the risk of atherosclerosis (See abstract, also col. 32, Example 6, Compound 6A, and col. 40,

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line 52 particularly, claims 6 and 10). '966 also teaches the dosage of ezetimibe for treating hypercholesterolemia as 0.1-30 or 0.1-15 mg/kg (see col. 21, line 17-19). '966 also teaches the dosage of HMG-CoA reductase inhibitors as 10-80mg daily to 1-1000mg daily depending upon the agents used (See col. 21, lines 27-42).

'966 does not expressly teach the employing of ezetimibe with simvastatin, a HMG-CoA reductase inhibitor and/or cholestyramine, in the dosage herein claimed to treat sitosterolemia.

Belamarich et al. teaches that hypercholesterolemia is one of the manifestation of sitosterolemia (See page 977, col. 2, second to last paragraph). Belamarich et al. also teaches cholestyramine and low-sterol diet as effective in lowering the both cholesterol and sterol levels in sitosterolemic pateints (See page 979, col. 2, last paragraph bridging page 980, col. 1, first full paragraph).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to employ ezetimibe with simvastatin and/or cholestyramine, in the dosage herein claimed to treat sitosterolemia.

One of ordinary skill in the art would have been motivated to employ ezetimibe with simvastatin and/or cholestyramine, in the dosage herein claimed to treat sitosterolemia. '966 teaches the combination of simvastatin and ezetimibe as useful in reducing cholesterol level. Employing the combination of simvastatin and ezetimibe in a method to reduce cholesterol level and thereby treating sitosterolemia, a condition known to have elevated cholesterol level, would have been reasonably expected to be effective, absent evidence to the contrary. Moreover, cholestyramine is known to be

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effective in lowering cholesterol in sitosterolemic patient. Therefore, administering all three compounds concomitantly for the very same purpose would have been obvious to one of ordinary skill in the art (See *In re Kerkhoven* 205 USPQ 1069). Furthermore, optimization of result effect parameters (e.g., dosage range, dosing regimens) is obvious as being within the skill of the artisan.

(11) Response to Argument

Appellant's arguments in pages 10-15 in the Brief filed June 6, 2005 averring Hidaka et al. and Nguyen's teachings with regard to the ineffectiveness of HMG-CoA reductase inhibitors treating sitosterolemia are unconvincing. As discussed in the Final rejection and Advisory action, the basis of the rejection set forth in the previous office action is not based on whether the herein claimed compounds are useful to lower the plasma sterol or not. Hypercholesterolemia is frequently experienced by sitosterolemic patients. In other words, some sitosterolemic patients actually are also hypercholesterolemic. Such symptoms can be treated with the herein claimed agents, according to the teachings of cited prior arts. Treating hypercholesterolemia in such sitosterolemic patients using the herein claimed compounds would be reasonably expected to be useful. Examiner notes that the cited prior arts' teachings suggest the very same steps of treatment: employing the same compounds to the same patients population as instant claims recited. Appellant's arguments are merely directed toward the failure of the herein claimed agents to decrease plasma sterol levels, which is not relevant to the basis of rejection set forth in the previous office action. Possessing the

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teachings of the cited prior art, one of ordinary skill in the art would have been motivated to employ the herein claimed agents to sitosterolemic patients that also experience hypercholesterolemia. Treating the symptoms of a disease would be considered as treatment of the same. Therefore, in the instant case, treating hypercholesterolemia in certain sitosterolemic patients, whom also suffered from hypercholesterolemia, by employing the herein claimed agents would be obvious.

Appellant's arguments in page 15-17 averring long-felt need being met are unconvincing. Evidence provided by the appellant should be still considered deficient because there is no showing that others of ordinary skill in the art were working on the problem and if so, for how long. In addition, there is no evidence that if persons skilled in the art who were presumably working on the problem knew of the teachings of the above cited references, they would still be unable to solve the problem. See MPEP § 716.04. Furthermore, the article of Steiner is a post filing date article, which could not be a probative evidence to show long felt need in the instant case. Furthermore, Steiner does not even disclose the state of the art at the time of the filing date of the instant invention. Steiner is a general teachings or overview of sitosterolemia. As discussed above, no evidence was provided showing if persons skilled in the art who were presumably working on the problem knew of the teachings of the above cited references, they would still be unable to solve the problem.

Appellant's arguments in pages 18-20 with regard to rejection of claims 15-14, 33, 41-43, 54, and 55 are not convincing. Appellant merely focus on the ineffectiveness of HMG-CoA reductase inhibitors to reduce sterol levels. However, the basis of the

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rejection set forth in the previous office action is not based on whether the herein claimed compounds are useful to lower the plasma sterol or not. Hypercholesterolemia is frequently experienced by sitosterolemic patients (See Belamarich et al.). In other words, some sitosterolemic patients actually are also hypercholesterolemic. Such symptoms can be treated with the herein claimed agents, according to the teachings of cited prior arts. Treating hypercholesterolemia in such sitosterolemic patients using the herein claimed compounds would be reasonably expected to be useful. Examiner notes that the cited prior arts' teachings suggest the very same steps of treatment: employing the same compounds to the same patients population as instant claims recited. Possessing the teachings of the cited prior art, one of ordinary skill in the art would have been motivated to employ the herein claimed agents to sitosterolemic patients that also experience hypercholesterolemia. Treating the symptoms of a disease would be considered as treatment of the same. Therefore, in the instant case, treating hypercholesterolemia in certain sitosterolemic patients, whom also suffered from hypercholesterolemia, by employing the herein claimed agents would be obvious.

Appellant's arguments in pages 20-22 with regard to rejection of claims 32 and 43-45 are not convincing. Appellant's arguments are merely directed toward the failure of the herein claimed agents to decrease plasma sterol levels, which is not relevant to the basis of rejection set forth in the previous office action. As discussed above, Hypercholesterolemia is frequently experienced by sitosterolemic patients (See Belamarich et al.). In other words, some sitosterolemic patients actually are also hypercholesterolemic. Such symptoms can be treated with the herein claimed agents,

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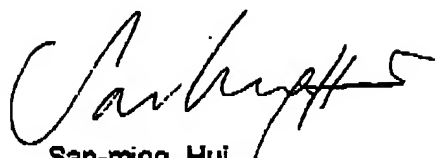
according to the teachings of cited prior arts. Treating hypercholesterolemia in such sitosterolemic patients using the herein claimed compounds would be reasonably expected to be useful. Examiner notes that the cited prior arts' teachings suggest the very same steps of treatment: employing the same compounds to the same patients population as instant claims recited. Possessing the teachings of the cited prior art, one of ordinary skill in the art would have been motivated to employ the herein claimed agents to sitosterolemic patients that also experience hypercholesterolemia. Treating the symptoms of a disease would be considered as treatment of the same. Therefore, in the instant case, treating hypercholesterolemia in certain sitosterolemic patients, whom also suffered from hypercholesterolemia, by employing the herein claimed agents would be obvious.

For the above reasons, it is believed that the rejections should be sustained.

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Respectfully submitted,



San-ming Hui
Primary Examiner
Art Unit 1617


August 15, 2005

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